



Rio Rancho Water Quality

2009 Report

This annual report details the water quality for Rio Rancho's drinking water supply during 2009.

The city of Rio Rancho provides this Consumer Confidence Report each year to help residents learn more about the city's role in providing and maintaining safe and healthy water supplies.

Rio Rancho is committed to providing water utility services to ensure the ongoing safety and health of the community. Rio Rancho works proactively to maintain our vital water supply with investments in infrastructure to remove contaminants and recycle water, along with water conservation and education.

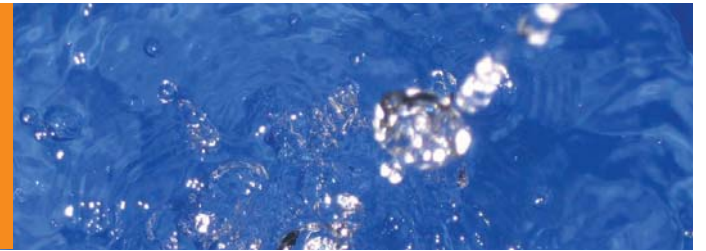
As mayor, I encourage you to be informed and active participants in our water management initiatives. I invite you to attend and participate in our Utilities Commission meetings that shape our water future. Together, we can conserve today to preserve tomorrow.

Mayor Thomas E. Swisstack



Este informe contiene información importante acerca de su agua potable. Haga que alguien lo traduzca para usted, o hable con alguien que lo entienda.

Sources



early 90 percent of New Mexico's 1.8 million people depend on groundwater for their drinking water supply. Ongoing protection of groundwater is essential for public health and welfare.

Rio Rancho's drinking water source does not come from the Rio Grande. Our water comes from the Santa Fe Group Aquifer. This underground source supplies all water for citizens and businesses in the City of Vision.

Water Sources

Rio Rancho depends on water flowing throughout the water cycle – from below the earth's surface in the aquifer, to our community as drinking water, to our plants as irrigation, and to the sky as evaporation, and around again.

Our aquifer is composed of layers of sand, gravel and permeable rock interspersed with water. Removing water from the aquifer depletes Rio Rancho's water supply.

To help preserve the aquifer and maintain ongoing water resources, the city promotes water conservation. Currently, Rio Rancho provides reuse water for irrigation on large turf areas, such as the golf course. Recycled water filters down toward the aquifer, slowly letting water reabsorb into the ecosystem.

Water Safety

The sources of drinking water (both tap and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land and through the ground, it dissolves naturally-occurring minerals, and in some cases, radioactive material. Water can also pick up substances resulting from the presence of animals or from human activity.

To ensure tap water is safe to drink, the Environmental Protection Agency (EPA) prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration regulations establish limits for contaminants in bottled water which must provide the same protection of public health. For questions about Rio Rancho's water testing, please call 505-896-8813.

Water Quality

The Susceptibility Analysis of the Rio Rancho water utility reveals that the utility is well maintained and operated and the sources of drinking water are generally protected from potential sources of contamination. The susceptibility rank of the entire water system is MODERATELY LOW. Call 1-877-654-8720 for questions.





Growing

The city of Rio Rancho is implementing a comprehensive water reuse program to augment available water supplies.

Aquifer Storage & Recovery

The city just completed a pilot-scale, advanced water treatment system using oxidation and biological activated carbon to enhance the quality of reuse water.

The pilot study evaluated existing effluent quality and determined whether additional water treatment is needed prior to aquifer recharge by direct injection. Five monitor wells and an injection well are under construction near Northern Boulevard and Stapleton Elementary School. The monitor wells will be used as sampling ports to monitor and test for any changes to level or quality of the groundwater.

Once construction is complete, another pilot study will be conducted with potable water to determine the rate of infiltration and any chemical changes to the groundwater. After testing completion, high quality reclaimed water will be injected into the main well and stored for future use.



Investing In Our Future

The city continues to invest in water and wastewater infrastructure projects. These were some projects completed in 2009:

- Arsenic treatment facilities on Well 10 - \$11.5 million
- Lift station 14.2 - \$5.3 million
- Cleveland High School water line - \$1.3 million
- Cleveland High School lift station - \$800,000



Inorganic Contaminants

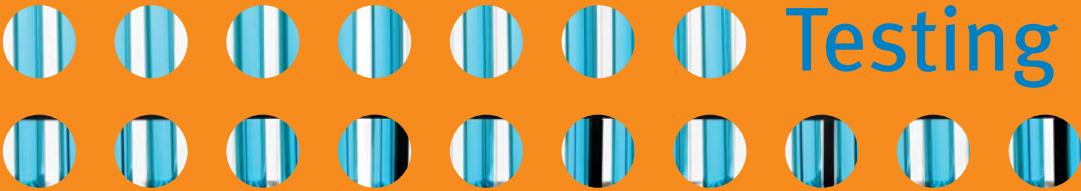
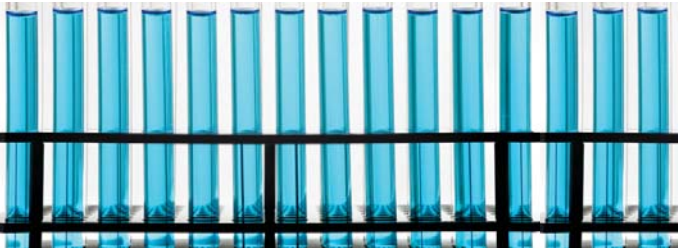
Substance	MCL	MCLG	Our Water	Range of Detection	Violation	Typical Source of Contamination
Arsenic (ppb) tested in 2009	10	0	6 (average)	3 - 19	No	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm) tested in 2009	2	2	0.15	0.018 - 0.15	No	Erosion of natural deposits; discharge from drilling wastes and metal refineries
Chromium (ppm) tested in 2009	0.1	0.1	0.011	0.001 - 0.011	No	Discharge from steel and pulp mills; erosion of natural deposits
Copper (ppm) tested in 2008	1.3 (AL)	1.3	0.15 (90th percentile)	N/A	No	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Fluoride (ppm) tested in 2009	4	4	0.6	0 - 0.6	No	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Lead (ppb) tested in 2008	15 (AL)	0	0 (90th percentile)	N/A	No	Corrosion of household plumbing systems; erosion of natural deposits
Nitrate + Nitrite (ppm) tested in 2009	10	10	4.5	0.12 - 4.5	No	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

Drinking Water:
Including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk.

Range:
Highest and lowest levels of substance found in treated drinking water.

AL:
Action Level – the concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.

N/A:
Not applicable



Radioactive
Contaminants

Substance	MCL	MCLG	Our Water	Range of Detection	Violation	Typical Source of Contamination
Alpha emitters (pCi/L) tested 2009	15	0	1.5	0.9 - 1.5	No	Erosion of natural deposits
Beta emitters (pCi/L) tested 2009	50	0	6.1	0.8 - 6.1	No	Erosion of natural deposits
Combined Radium (pCi/L) tested 2009	5	0	0.49	0.25 - 0.49	No	Erosion of natural deposits
Uranium (ppb) tested 2009	30	0	2.06	1.8 - 2.06	No	Erosion of natural deposits

MCL:

Maximum Contaminant Level – the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

MCLG:

Maximum Contaminant Level Goal – the level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

ppb:

Parts per billion or micrograms per liter - approximately equal to 1 drop of water in a 22,000 gallon swimming pool.

ppm:

Parts per million or milligrams per liter - approximately equal to 1 drop of water in 22 gallons.

Distribution
System Detection

Substance	MCL	MCLG	Our Water	Range of Detection	Violation	Typical Source of Contamination
Total Coliform Bacteria tested 2009	5% positive	0	1%*	N/A	No	Naturally present in the environment
Chlorine residual (ppm) tested 2009	4 MRDL	4	0.38 (average)	0.33 - 0.46	No	Water additive to control microbes

* One sample in February 2009 and one in May 2009

Testing



Radioactive Contaminants:

Which can be naturally-occurring or be the result of oil and gas production and mining activities.

pCi/L:

Picocuries per liter – a measure of radioactivity.

Microbial Contaminants:

Viruses and bacteria which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.

MRDL:

Maximum Residual Disinfectant Level – The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

Volatile Organic Contaminants

Substance	MCL	MCLG	Our Water Average	Range of Detection	Violation	Typical Source of Contamination
Total Trihalomethanes (ppb) tested in 2009	80	N/A	9.16	0.2 - 39.7	No	Byproduct of drinking water chlorination
Haloacetic Acids (ppb) tested in 2009	60	N/A	2.31	1.1 - 5.9	No	Byproduct of drinking water chlorination

Organic Chemical Contaminants:

Synthetic and volatile organic chemicals, which are byproducts of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, & septic systems.

Inorganic Contaminants:

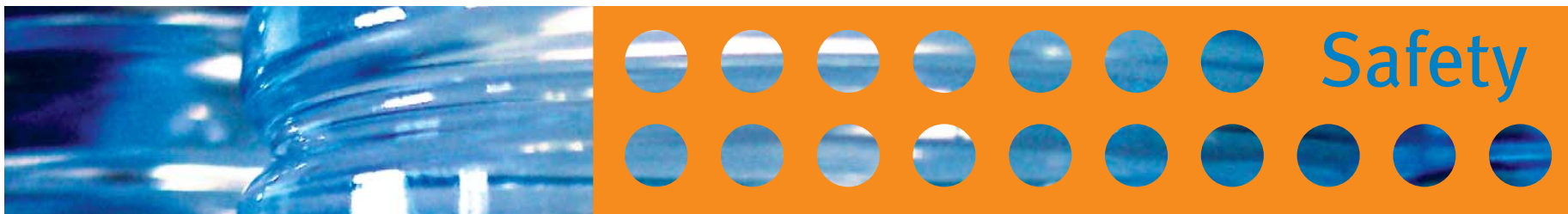
Salts and metals which can be naturally-occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil & gas production, mining, or farming.


Pesticides and Herbicides:

Which may come from a variety of sources such as agriculture, stormwater runoff, and residential uses.

Safe Drinking Water Hotline:

EPA's Safe Drinking Water Hotline at 1-800-426-4791.



ome people may be more vulnerable to contaminants in drinking water than the general population. Please seek advice about drinking water from your health care provider if you are:

- Immuno-compromised
- Undergoing chemotherapy
- A transplant recipient
- Living with HIV/AIDS or other immune system disorders
- Elderly or have a newborn that may be at risk from infections

The EPA Center for Disease Control guidelines on appropriate ways to lessen the risk of infection by *Cryptosporidium* and other microbial contaminants are available from the Safe Drinking Water Hotline at 1-800-426-4791.

Non-Sampling Violation

Our water system recently violated a drinking water standard. Although this is not an emergency, as our customers, you have a right to know what happened, what you should do, and what we are doing.

Rio Rancho is required to monitor your drinking water for specific contaminants on a regular basis. Results of regular monitoring are an indicator of whether or not our drinking water meets health standards.

Sampling and analyses are performed by the New Mexico Environment Department for most of the contaminants covered by the Safe Drinking Water Act.

In 2009, the state did not sample and test for Volatile Organic Compounds (VOCs) during the fourth quarter at Well 10A.

Additionally, a state laboratory error occurred with the Synthetic Organic Compounds (SOCs) sample during the first quarter at Well 22.

Due to these errors, the city did not monitor or test for the complete set of VOCs and SOCs. While these two wells have passed inspections in the past, the city cannot be certain of the quality of our drinking water during that time.

Some people who drink water containing arsenic in excess of the Maximum Contaminant Level (MCL) over many years could experience skin damage or problems with their circulatory system, and may have an increased risk of getting cancer.



Public input and participation regarding Rio Rancho's proactive water management programs are encouraged.

As representatives of the community, the Rio Rancho Utilities Commission helps define water policies.

Your Voice Matters

Utilities commissioners incorporate public input to establish policies concerning the operation and management of the water and wastewater services provided by the Utilities Division.

The commission also monitors the water and sewer rate changes and approves or denies requests for water availability from developers building subdivisions or developing commercial properties in the city limits.

The public is invited to participate at Utilities Commission meetings held on the third Tuesday of each month, at 6 p.m. at Rio Rancho City Hall. Meetings can be viewed online via <http://www.ci.rio-rancho.nm.us>.

Utilities Commissioners



Commissioners left to right:
Walker, White, Anastasi, Wilkins, Cleveland and Bajak

Utility Phone Numbers

- Administration **505-896-8715**
- Utilities Billing **505-891-5020**
- Report Leaks **505-891-5020**
- Emergency/Leaks After Hours **505-975-1581**
- Line Spots, NM One Call System **505-260-1990**
- Water Conservation **505-896-8715**
- Engineering **505-891-5016**
- Environmental Programs **505-896-8737**
- Water Waste Hotline **505-896-8299**

Learning

The city's Water Conservation Office provides ongoing outreach to Rio Rancho students to educate our youth about the importance of water for a sustainable community. Visit <http://www.ci.rio-rancho.nm.us> for information.

Every Drop Counts Award

The Water Conservation Office supports the scientific endeavors of our middle and high school students by honoring the best display of water conservation, water efficiency, or water quality with the "Every Drop Counts" award.

This year, Brandon Schmidt and Daniel Jaramillo won the second annual "Every Drop Counts" award for their water quality project at the Rio Rancho High School science fair. Their project was entitled "Dilapidated Daphnia - the Study of How Run-Off Drugs in our Water Supply Affect Organisms."



Brandon Schmidt and Daniel Jaramillo won the "Every Drop Counts" award



Essay winner Seamus Wade and teacher Mary Ann Lane

Winning Water Essay

~ By Seamus Wade, Fourth grader at Rio Rancho Elementary School

"My family plan to save water is to try and buy as many low flow toilets, faucets, etc. We will also xeriscape with native plants. We also don't mow because we have no grass which can save water so it won't irritate (sic) it. We will use the washer and the dish washer less then (sic) we used to do (about two times a day for the washer and three times a week for the dish washer). We will also use a tub of water instead of using the dish washer so the dish washer will not keep using clean water instead of reusing the water.

I will also take short five minute showers or take a bath so the shower doesn't act like the dish washer. When we brush our teeth we will just try to wash off and wet the toothpaste and wash it off again in just three seconds. And that is what we are going to do to save water and lower our water bill."



Conserving

“It was great to show residents from the metro area at the Xeriscape Expo what Rio Rancho is implementing to promote water conservation” said Ruben Archuleta, water conservation specialist.



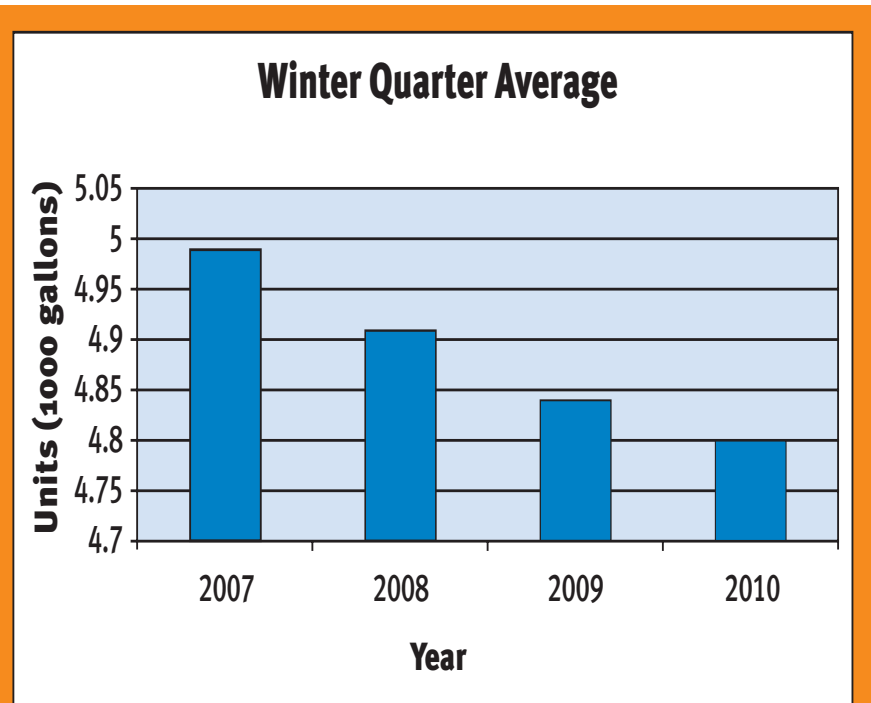
Ruben Archuleta explains water saving techniques at the Xeriscape Expo

Free Water Audits

The city’s Water Use Evaluation Program offers a free service for Rio Rancho water customers to help reduce water use and utility bills. This free evaluation includes a water use analysis, meter accuracy check, leak detection, and a low flow showerhead. Call 505-896-8715 for more information.

Lower Bills By Saving Water

The Winter Quarter Average (WQA) is used to calculate the sewer portion of the water and wastewater bill for the entire year. The single-family residential WQA of water use in 2009 has been calculated; it is 4.80 units (thousand gallons) per month. The graph shows the water conservation trend is improving over time. This demonstrates that Rio Rancho residents are conserving by using less water per month during the December, January and February billing periods.



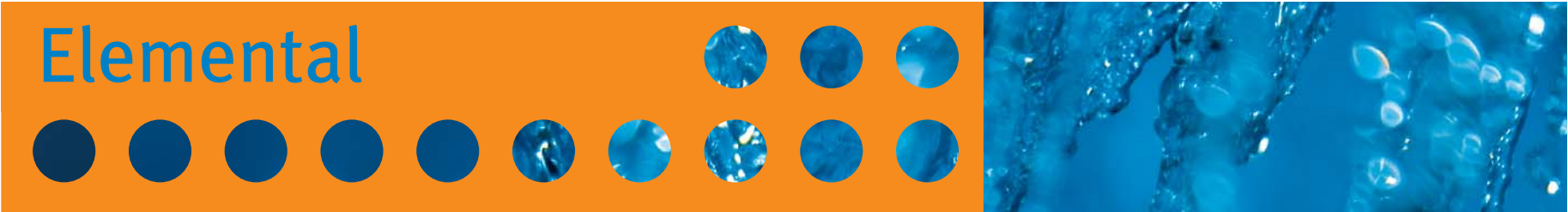
The graph shows that Rio Rancho residents are conserving more water every year

City of Rio Rancho
Utilities Division
3200 Civic Center Circle NE
Rio Rancho, NM 87144

PRESORTED STD
US POSTAGE PAID
RIO RANCHO, NM
Permit No. 1104



Postal Customer
Rio Rancho, NM



SPRING: Don't water
between 10:00 a.m.
& 6:00 p.m.
April 1st - Sept. 30th

SUMMER: Avoid
water runoff.
Call 896-8299 to report
water waste.

FALL: Reduce water
use over the winter
to lower your
water bill next year.

WINTER: Call 891-5020
to report leaks.
After hours emergency?
Call 975-1581.

